GOVERNMENT OF INDIA
NON-CONVENTIONAL ENERGY SOURCES
LOK SABHA

UNSTARRED QUESTION NO:3366
ANSWERED ON:11.12.2000
FUNDS FOR THE DEVELOPMENT OF N.C.E.S.
BHAN SINGH BHAURA;BHAWANA GAWALI (PATIL)

Will the Minister of NON-CONVENTIONAL ENERGY SOURCES be pleased to state:

(a) whether the Government have formulated any centrally sponsored scheme for the development of Non-Conventional Energy Sources in the country;

(b) if so, the details thereof;

(c) the details of new sources likely to be developed, location-wise;

(d) the total fund sanctioned for the development of non-conventional energy sources during each of the last three years, till date, scheme-wise and State-wise;

(e) whether the Government propose to provide more incentives for the development of non-conventional energy sources in the country and to make easy availability to the common people; and

(f) if so, the details thereof

Answer

MINISTER OF STATE FOR NON-CONVENTIONAL ENERGY SOURCES (INDEPENDENT CHARGE) (SHRI M. KANNAPPAN)

(a)&(b): Yes, Sir. The Ministry is implementing a wide range of centrally sponsored schemes/programmes to harness the potential of various non-conventional energy sources such as biogas, solar, wind, biomass, small hydro power and urban and industrial wastes etc. in the country. The details of such schemes and physical targets fixed for the Ninth Five Year Plan period are given in Annexure-I.

(c): The Ministry is supporting research and development projects in new areas of energy like fuel cells for power production, hydrogen energy, geo-thermal and ocean energy with the aim of developing indigenous technologies. Since these are still in the development stage, is it not possible to indicate the locations.

(d) : The State-wise funds released under various schemes/programmes during the last three years are given in the Annexure-II.

(e) & (f) : The Ministry is providing various fiscal, financial and promotional incentives i.e. central subsidy, 100% accelerated depreciation, concessional custom duty, excise duty/sales tax exemption, soft term loans, conducive policies for wheeling, banking, buy-back, third party sale of renewable energy power etc. for development and easy availability of non-conventional energy sources in the country and to make these system/devices more cost effective for the common people. In addition, higher subsidies/incentives are provided under major programmes to Special category of people such as Scheduled Castes and Scheduled Tribes as well as in specific areas such as the North-East States including Sikkim, Hill areas, Islands, etc.
DETAILS OF SCHEMES AND PHYSICAL TARGETS FIXED DURING 9th FIVE YEAR PLAN PERIOD.

Sl.No.	Programmes/Schemes	9th Plan Physical Target
1	National Project for Biogas Development	10 Lakhs
2	Community/Institutional/Night-soil based Biogas Plants	800 Nos.
3	National Programme on Improved chulhas	150 Lakhs
4	National Biomass Gasifier Programme	40 MW
5	Integrated Rural Energy Programme (IREP)	660 (Old Blocks) 200 (New Blocks)
6	Solar Photovoltaic (SPV) Demonstration Programme	
	SPV Home Light	2 Lakhs
	SPV Lanterns	3 Lakhs
	SPV Power Plants	1.6 MW
7	SPV Pumps	4000 Nos.
8	Solar Thermal (ST) Energy	
	Solar Water Heating Systems (M.sq. collector area)	1.5 Lakh
	Solar Cooker	1.5 Lakh Nos.
9	Wind Pumps & Hybrid Systems	1000 Nos. 250 kW

10 Wind power 1000 MW
11 Small Hydro Power (SHP) 130 MW
(Water Mills) 700 Nos. (Repair & Maintenance) 65 MW
12 Biomass Power 314 MW
13 Solar Power 141.5 MW
14 Urban & Industrial & National Bio-energy Board 42 MW

MW = Mega Watt; kW = Kilo Watt; M.sq. = Meter Square

(Rs. In Crores)

State/UT	Biogas			Biomass Power			Biomass Gasifier		
	1997-98	98-99	99-2000	97-98	98-99	99-2000	1997-98	98-99	1999-2000
Andhra Pradesh	5.820	6.140	7.450	0.037	0.116	3.570	0.745	0.290	0.326
Arunanchal Pra	0.070	0.100	0.050	0.003	0.036	0.040	~	~	~
Assam	0.270	0.150	0.100	~	~	0.050	0.005	0.009	~
Bihar	~	0.080	0.110	0.055	0.115	0.120	~	~	~
Goa	0.030	0.200	0.030	~	~	~	~	~	~
Gujarat	5.190	3.880	1.970	0.030	0.055	0.130	0.001	~	0.028
Haryana	0.620	0.450	0.830	~	0.005	0.080	~	~	~
Himachal Prad	1.110	0.300	0.530	~	~	~	~	~	~
Jammu & Kashmir	0.020	0.020	0.040	~	~	~	~	~	~
Karnataka	5.120	3.500	2.560	1.813	5.193	5.300	0.116	0.070	0.610
Kerala	0.230	0.300	1.710	0.002	0.020	0.050	~	~	0.024
Madhya Pradesh	4.230	3.740	5.970	0.970	0.124	0.790	~	0.344	0.100
Maharashtra	4.930	4.630	4.880	0.110	0.270	6.051	~	~	~
Manipur	0.130	0.240	0.140	~	~	~	~	~	~
Meghalaya	0.030	0.050	0.090	~	~	0.040	~	~	~
Mizoram	0.220	0.140	0.290	~	~	~	~	~	0.018
Nagaland	0.030	0.180	0.160	~	~	~	~	~	~
Orissa	1.560	3.080	4.290	0.003	0.020	0.090	~	0.005	0.002
Punjab	0.980	2.400	1.130	0.050	0.055	3.130	~	~	0.012
Rajasthan	0.370	0.250	0.200	~	~	0.070	~	~	~
Sikkim	0.150	0.170	0.190	~	~	~	~	~	~
Tamil Nadu	0.200	0.310	0.870	1.760	0.895	2.890	0.035	0.050	0.021
Tripura	0.060	0.070	0.110	~	~	~	~	~	0.100
Uttar Pradesh	1.000	4.610	2.710	1.560	0.070	0.070	~	~	0.042
West Bengal	1.500	3.230	7.150	0.003	0.037	0.070	0.200	0.228	0.204
A & Nicobar	~	~	~	~	~	~	~	~	~
Chandigarh	~	~	~	~	~	~	~	~	~
D & N Haveli	~	~	~	~	~	~	~	~	~
Daman & Diu	~	~	~	~	~	~	~	~	~
Delhi	~	~	~	0.010	0.050	0.070	~	~	~
Lakshwadeep	~	~	~	~	~	~	~	~	~
Pondicherry	~	~	~	~	~	~	~	~	~
Others	21.020	16.410	15.950	0.005	~	~	~	~	~
Total	54.890	54.630	59.510	6.409	7.061	22.611	1.101	0.996	1.487

State-wise and Year-wise funds released under various programmes of the Ministry during last three years of Ninth Plan Period.

(Rs. In crores)

Sl. No.	State/UT	SADP (Energy Park)			Biomass Gasifier			Biomass Power		
		1997-98	98-99	99-2000	1997-98	98-99	99-2000	1997-98	98-99	99-2000
1	Andhra Pradesh	0.002	0.027	0.173	0.745	0.290	0.326	0.037	0.116	3.570
2	Arunanchal Pra	0.006	0.030	~	~	~	~	0.003	0.036	0.040
3	Assam	0.020	0.070	0.040	0.005	0.009	~	~	~	0.050
4	Bihar	0.014	0.070	~	~	~	~	0.055	0.115	0.120
5	Goa	0.002	0.006	~	~	~	~	~	~	~
6	Gujarat	0.024	~	0.060	0.001	~	0.028	0.030	0.055	0.130
7	Haryana	0.050	0.008	0.090	~	~	~	~	0.005	0.080
8	Himachal Pra	0.011	~	0.080	~	~	~	~	~	~
9	Jammu & Kashmir	~	~	0.033	~	~	~	~	~	~

10	Karnataka	0.030	0.050	0.020	0.116	0.070	0.610	1.813	5.193	5.300
11	Kerala	~	~	~	~	~	0.024	0.002	0.020	0.050
12	Madhya Prad	0.060	0.020	~	~	0.344	0.100	0.970	0.124	0.790
13	Maharashtra	0.050	0.060	0.085	~	~	~	0.110	0.270	6.051
14	Manipur	0.011	0.050	0.050	~	~	~	~	~	~
15	Meghalaya	~	~	~	~	~	~	~	0.040	
16	Mizoram	0.003	0.013	0.050	~	~	0.018	~	~	~
17	Nagaland	~	~	0.040	~	~	~	~	~	
18	Orissa	~	~	~	~	0.005	0.002	0.003	0.020	0.090
19	Punjab	0.130	0.028	~	~	~	0.012	0.050	0.055	3.130
20	Rajasthan	~	0.007	~	~	~	~	~	~	0.070
21	Sikkim	~	~	~	~	~	~	~	~	~
22	Tamil Nadu	0.003	0.080	0.063	0.035	0.050	0.021	1.760	0.895	2.890
23	Tripura	0.013	0.013	0.012	~	~	0.100	~	~	~
24	Uttar Pradesh	0.015	0.009	0.040	~	~	0.042	1.560	0.070	0.070
25	West Bengal	0.017	0.300	0.103	0.200	0.228	0.204	0.003	0.037	0.070
26	A & Nicobar	0.004	0.024	0.012	~	~	~	~	~	~
27	Chandigarh	0.003	0.013	0.015	~	~	~	~	~	~
28	D & N Haveli	~	~	~	~	~	~	~	~	~
29	Daman & Diu	~	~	~	~	~	~	~	~	~
30	Delhi	0.009	0.013	0.030	~	~	~	0.010	0.050	0.070
31	Lakshwadeep	~	~	~	~	~	~	~	~	~
32	Pondicherry	0.003	0.013	0.008	~	~	~	~	~	~
33	Others	0.050	~	0.020	~	~	~	0.005	~	~
	Total	0.528	0.903	1.024	1.101	0.996	1.487	6.409	7.061	22.611

State-wise and Year-wise funds released under various programmes of the Ministry during last three years of Ninth Plan Period

(Rs. In crores)

Sl. No.	State/UT	Wind Power Programme			Solar Power			Small Hydro Power		
		1997-98	98-99	99-2000	97-98	98-99	99-2000	97-98	98-99	99-2000
1	Andhra Pradesh	0.199	0.049	0.063	~	0.200	~	~	~	~
2	Arunanchal Pra	~	~	~	~	~	~	6.600	~	~
3	Assam	~	0.010	~	~	~	~	~	1.800	
4	Bihar	~	~	~	~	~	~	0.054	~	~
5	Goa	~	~	~	~	~	~	~	~	~
6	Gujarat	0.477	0.020	0.040	~	~	~	~	~	~
7	Haryana	~	0.005	0.015	~	~	~	~	~	~
8	Himachal Pra	0.029	~	~	~	~	~	1.830	1.080	1.162
9	Jammu & Kashmir	~	~	~	~	~	~	~	~	~
10	Karnataka	0.077	~	0.067	~	~	~	~	~	~
11	Kerala	0.022	~	~	0.090	0.250	0.110	~	~	~
12	Madhya Pradesh	0.069	~	0.008	~	1.000	0.296	~	0.445	~
13	Maharashtra	0.072	1.790	1.880	~	~	~	~	~	0.340
14	Manipur	~	~	~	~	~	~	~	1.000	0.306
15	Meghalaya	~	~	~	~	~	~	0.008	0.085	0.034
16	Mizoram	~	~	~	~	~	~	9.105	2.700	2.183
17	Nagaland	~	~	~	~	~	~	~	0.270	~
18	Orissa	~	~	~	0.190	0.070	~	~	~	~
19	Punjab	0.032	~	0.035	~	0.220	1.675	0.167	~	0.848
20	Rajasthan	~	0.040	3.760	~	~	~	~	~	~
21	Sikkim	~	~	~	~	~	~	1.360	3.750	3.525
22	Tamil Nadu	0.884	0.620	0.290	0.650	~	~	~	~	0.488
23	Tripura	~	~	~	~	~	~	~	~	~
24	Uttar Pradesh	~	~	~	0.645	0.210	0.160	~	~	0.212
25	West Bengal	0.022	0.480	0.230	0.325	0.050	0.054	~	1.540	1.406
26	A & Nicobar	~	~	~	~	0.105	0.100	~	~	~
27	Chandigarh	~	~	~	~	~	~	~	~	~
28	Da & N Haveli	~	~	~	~	~	~	~	~	~
29	Daman & Diu	~	~	~	~	~	~	~	~	~
30	Delhi	0.015	~	~	~	~	~	~		
31	Lakshwadeep	~	~	0.010	~	0.510	1.050	~	~	~
32	Pondicherry	0.005	~	~	~	~	~	~	~	
33	Others	1.194	1.355	1.390	~	~	~	~	~	~
	Total	3.081	4.384	7.788	1.900	2.615	3.445	19.124	10.870	12.304

State-wise and year-wise funds released under various programmes of the Ministry during last three years of the Ninth Plan Period

(Rs. In crores)

Sl. No.	State/UT	U & I			Solar Thermal			Solar Cooker		
		1997-9	98-99	99-2000	1997-98	98-99	99-2000	1997-98	98-99	99-2000
1	Andhra Pradesh	0.111	0.440	1.374	0.033	0.020	0.016	0.025	0.020	0.018
2	Arunanchal Pra	~	~	~	0.009	~	~	~	~	
3	Assam	~	~	~	~	0.017	0.002	~	~	
4	Bihar	~	0.002	~	~	~	~	~	~	
5	Goa	~	~	~	~	~	0.003	~	~	0.003
6	Gujarat	0.020	1.984	0.254	0.077	0.071	0.068	0.074	0.040	0.068
7	Haryana	~	~	~	0.002	0.060	0.034	~	0.004	0.034
8	Himachal Pra	~	0.002	~	0.023	~	0.118	0.020	~	0.056
9	Jammu & Kashmir	~	~	~	~	~	~	~	~	~
10	Karnataka	~	0.400	~	~	~	~	~	~	~
11	Kerala	0.006	~	~	~	0.023	0.005	~	~	
12	Madhya Pradesh	0.044	0.950	1.902	0.143	0.062	0.287	0.119	0.060	0.290
13	Maharashtra	0.050	~	1.550	0.019	0.015	0.047	~	~	
14	Manipur	~	~	~	0.006	0.002	0.011	~	~	
15	Meghalaya	~	~	~	~	~	~	~	~	
16	Mizoram	~	~	~	0.004	0.009	0.042	~	~	
17	Nagaland	~	~	~	~	~	0.140	~	~	
18	Orissa	~	0.050	~	~	~	0.013	~	~	0.013
19	Punjab	~	~	0.001	0.042	0.083	0.125	0.029	0.030	0.095
20	Rajasthan	~	~	~	0.008	0.098	0.042	~	~	
21	Sikkim	~	~	~	~	~	~	~	~	
22	Tamil Nadu	0.002	0.337	0.622	0.036	0.056	0.014	~	~	0.002
23	Tripura	~	~	~	0.005	0.004	0.003	0.005	~	0.007
24	Uttar Pradesh	0.010	0.083	~	0.051	0.069	0.242	0.033	0.037	0.053
25	West Bengal	~	~	~	0.049	0.290	0.064	0.026	0.020	0.032
26	A & Nicobar	~	~	~	~	~	~	~	~	
27	Chandigarh	~	~	~	~	~	~	0.009	~	0.008
28	D & N Haveli	~	~	~	~	~	~	~	~	
29	Daman & Diu	~	~	~	~	~	~	~	~	
30	Delhi	0.375	~	0.230	0.013	0.013	0.077	~	~	
31	Lakshwadeep	~	~	~	~	~	~	~	~	
32	Pondicherry	~	~	~	~	0.028	0.024	~	~	0.002
33	Others	~	~	~	~	~	~	~	~	
	Total	0.507	3.808	4.559	0.519	0.918	1.376	0.340	0.211	0.680

Sl. No.	State/UT	SPV Water Pumping, Wind Mills & Small Aero-generators			Solar Photovoltaic Programme		
		1997-98	1998-99	1999-2000	1997-98	1998-99	1999-2000
1	Andhra Pradesh	0.097	~	0.003	~	1.654	0.549
2	Arunanchal Pra	~	~	~	0.104	0.312	0.226
3	Assam	~	~	~	0.216	0.704	0.229
4	Bihar	~	~	0.006	0.250	2.455	3.697
5	Goa	~	~	~	~	0.009	0.015
6	Gujarat	~	0.104	0.267	0.064	1.047	0.816
7	Haryana	~	~	~	1.049	1.757	1.839
8	Himachal Pradesh	~	0.010	~	0.702	1.672	3.215
9	Jammu & Kashmir	~	~	~	0.405	1.631	3.359
10	Karnataka	0.051	~	0.001	0.071	0.463	0.418
11	Kerala	0.010	0.064	0.120	~	1.027	2.084
12	Madhya Pradesh	~	~	~	0.599	0.930	0.255
13	Maharashtra	0.329	0.158	0.151	0.233	0.210	0.183
14	Manipur	~	~	~	~	0.308	0.433
15	Meghalaya	~	~	~	0.075	0.186	0.084
16	Mizoram	~	~	~	0.078	0.240	0.157
17	Nagaland	~	~	~	~	0.052	0.073
18	Orissa	~	~	~	0.450	2.719	3.010
19	Punjab	~	~	~	0.644	2.744	2.371
20	Rajasthan	0.195	0.118	~	1.342	4.806	3.151
21	Sikkim	~	~	~	~	0.074	0.027
22	Tamil Nadu	~	0.034	0.290	~	0.498	0.197
23	Tripura	~	~	~	0.257	0.832	0.664
24	Uttar Pradesh	~	~	~	6.563	8.670	3.680
25	West Bengal	~	~	~	2.122	1.731	3.857
26	Andaman & Nicobar	~	0.005	~	~	~	~

27	Chandigarh	~	~	~	0.035	0.206	0.042
28	Dadar& Nag Haveli	~	~	~	~	~	~
29	Daman & Diu	~	~	~	~	~	~
30	Delhi	~	~	~	~	~	0.072
31	Lakshwadeep	~	~	~	~	0.040	0.119
32	Pondicherry	~	~	~	0.026	0.017	0.026
33	Others	~	~	~	~	~	0.518
	Total	0.683	0.493	0.837	15.285	35.340	34.816